AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

- 1.-30. (Canceled).
- 31. (New) A fuel oil additive, which consists of at least one oil-soluble metal salt of an organic acid of a general formula MR, wherein R is an organic acid radical and the corresponding organic acid is a C_1 C_{25} saturated or unsaturated aliphatic acid or a polybasic carboxylic acid, naphthenic acid or aromatic acid, M is a metal cation, metal complex ion or metal clathrate compound ion,

said oil-soluble metal salt of the organic acid is selected from the group consisting of an alkali metal salt of an organic acid, a combination of an alkali metal salt of an organic acid and an alkali-earth metal salt of an organic acid and/or a rare-earth metal salt of an organic acid, a combination of an alkali metal salt of an organic acid and an alkali-earth metal salt of an organic acid and/or a transition metal salt of an organic acid, a combination of an alkali metal salt of an organic acid and an alkali-earth metal salt of an organic acid and rare-earth metal salt of an organic acid and transition metal salt of organic acid;

wherein said alkali metal is lithium, sodium, potassium, rubidium or cesium, and the corresponding cation is a monovalent ion; said alkali-earth metal is beryllium, magnesium, calcium, strontium or barium, and the corresponding cation is a divalent ion; said rare-earth metal is scandium, yttrium, lanthanum, cerium or neodymium; and said transition metal is selected from zinc or titanium.

32. (New) The fuel oil additive as claimed in Claim 31, wherein said organic acid is a C₁- C₁₀ saturated or unsaturated aliphatic acid or a polybasic carboxylic acid, naphthenic acid or

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aromatic acid.

- 33. (New) A fuel oil additive as claimed in Claim 31, wherein said organic acid is a C₁-C₂₅ saturated or unsaturated aliphatic acid or a polybasic carboxylic acid, naphthenic acid or aromatic acid.
- 34. (New) The fuel oil additive as claimed in Claim 31, which consists of more than one oil-soluble metal salt of an organic acid selected from the group consisting of a combination of one or more alkali metal salts of an organic acid and one or more alkali-earth metal salts of an organic acid and/or one or more rare-earth metal salts of an organic acid, a combination of one or more alkali metal salts of an organic acid and one or more alkali-earth metal salts of an organic acid and/or one or more transition metal salts of organic acid, wherein the ratio of one or more alkali metal salts of organic acid to the other component is 5-80%.
- 35. (New) The fuel oil additive as claimed in Claim 34, which consists of more than one oil-soluble metal salts of organic acid selected from the group consisting of a combination of one or more alkali metal salts of an organic acid and one or more alkali-earth metal salts of an organic acid and/or one or more rare-earth metal salts of an organic acid, wherein the ratio of one or more alkali metal salts of an organic acid to the other component is 5-80%.
- 36. (New) The fuel oil additive as claimed in Claim 35, wherein said one or more alkali metal salts comprises at least one lithium salt of an organic acid.
- 37. (New) The fuel oil additive as claimed in Claim 31, which also includes a gasoline additive, diesel oil additive, kerosene additive, heavy oil additive and residual oil additive.
- 38. (New) The gasoline antiknock agent, which consists of at least one oil-soluble metal salt of an organic acid of a general formula MR, wherein R is an organic acid radical and the corresponding organic acid is a C_1 - C_{25} , saturated or unsaturated aliphatic acid or a polybasic

carboxylic acid, naphthenic acid or aromatic acid, M is a metal cation, metal complex ion or metal clathrate compound ion;

said one or more oil-soluble metal salts of the organic acid is selected from the group consisting of an alkali metal salt of organic acid, a combination of an alkali metal salt of an organic acid and an alkali-earth metal salt of an organic acid and/or rare-earth metal salt of an organic acid, a combination of an alkali metal salt of an organic acid and an alkali-earth metal salt of an organic acid and/or a transition metal salt of an organic acid, a combination of an alkali metal salt of an organic acid and an alkali-earth metal salt of an organic acid and a rare-earth metal salt of an organic acid and a transition metal salt of an organic acid;

wherein said alkali metal is lithium, sodium, potassium, rubidium or cesium, and the corresponding cation is a monovalent ion, said alkali-earth metal is beryllium, magnesium, calcium, strontium or barium, and the corresponding cation is a divalent ion; said rare-earth metal is scandium, yttrium, lanthanum, cerium or neodymium; and said transition metal is selected from zinc or titanium.

- 39. (New) The gasoline antiknock agent as claimed in Claim 38, wherein said organic acid is a C₁-C₁₀ saturated or unsaturated aliphatic acid or a polybasic carboxylic acid, naphthenic acid or aromatic acid.
- 40. (New) A gasoline antiknock agent as claimed in Claim 38, wherein said organic acid is a C₁-C₂₅, saturated or unsaturated aliphatic acid or a polybasic carboxylic acid, naphthenic acid or aromatic acid.
- 41. (New) The gasoline antiknock agent as claimed in Claim 38, which consists of more than one oil-soluble metal salt of an organic acid selected from the group consisting of a combination of one or more alkali metal salts of an organic acid and one or more alkali-earth

metal salts of an organic acid and/or one or more rare-earth metal salts of an organic acid, a combination of one or more alkali metal salts of an organic acid and one or more alkali-earth metal salts of an organic acid and/or one or more transition metal salts of an organic acid, wherein the ratio of one or more alkali metal salt of an organic acid to the other component is 5-80%.

- 42. (New) The gasoline antiknock agent as claimed in Claim 41, which consists of more than one oil-soluble metal salt of an organic acid selected from the group consisting of a combination of one or more alkali metal salts of an organic acid and one or more alkali-earth metal salts of an organic acid and/or one or more rare-earth metal salts of an organic acid, wherein the ratio of one or more alkali metal salts of organic acid to the other component is 5-80%.
- 43. (New) The gasoline antiknock agent as claimed in Claim 42, wherein said one or more alkali metal salts comprises at least one lithium salt of an organic acid.
- 44. (New) A fuel oil containing the fuel oil additive as claimed in Claim 31, wherein the amount of said fuel oil additive is 0.1-15 g per liter of said fuel oil.
 - 45. (New) A fuel oil as claimed in Claim 44, which is gasoline or diesel oil.
- 46. (New) A gasoline containing the gasoline antiknock agent as claimed in Claim 38, wherein the amount of the gasoline antiknock agent is 0.1-15 g per liter of said gasoline.
- 47. (New) A method of increasing the octane number and improving the anti-knock property of gasoline comprising adding the gasoline anti-knock agent as claimed in claim 38 to gasoline in an amount of from 0.1 to 15 g of the gasoline anti-knock agent per liter of gasoline.